



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/820,575	04/07/2004	Scott E. Moore	MI22-2493	8575
21567	7590	04/21/2005	EXAMINER	
WELLS ST. JOHN P.S. 601 W. FIRST AVENUE, SUITE 1300 SPOKANE, WA 99201			PUNNOOSE, ROY M	
			ART UNIT	PAPER NUMBER
			2877	

DATE MAILED: 04/21/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

SM

<b>Office Action Summary</b>	<b>Application No.</b> 10/820,575	<b>Applicant(s)</b> MOORE ET AL.	
	<b>Examiner</b> Roy M. Punnoose	<b>Art Unit</b> 2877	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 19 November 2004.
- 2a) ☐ This action is FINAL.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 19-21, 49-52 and 59-64 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 64 is/are allowed.
- 6) ☒ Claim(s) 19-21, 49-52 and 59-63 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 07 April 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date <u>4/04; 5/04; 11/04</u> . | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

### ***Pre-Amendment***

1. In the pre-amendment filed on April 07, 2004, claims 1-18, the applicant has canceled 22-48, and 53-58 without prejudice. Claims 59-64 were added. Currently claims 19-21, 49-52, and 59-64 are pending in the application.

### ***Information Disclosure Statement***

2. The information disclosure statement filed on 4/7/2004 fails to comply with 37 CFR 1.98(a)(2), which requires a legible copy of each cited foreign patent document; each non-patent literature publication or that portion which caused it to be listed; and all other information or that portion which caused it to be listed. It has been placed in the application file, but the information referred to therein has not been considered. The prior art cited under "Other References" on page 2 of the PTO-1449 were not available to the Examiner and therefore were not considered. The websites listed were not valid or not accessible to the Examiner.

### ***Claim Objections***

3. Claim 20 is objected to because of the following informalities: The recitation "... at least one sensor comprises a plurality of sensors ..." creates doubt as to whether the plurality of sensors are an integral part of the (first) sensor. It will be more appropriate if the claim is amended to recite "... at least one sensor comprises a plurality of ~~sensors~~ detectors ...".  
Appropriate correction is required.

### ***Claim Rejections - 35 USC § 102***

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

Art Unit: 2877

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

5. Claims 19, 21, 49, 51, 52, 59-61 and 62 are rejected under 35 U.S.C. 102(b) as being anticipated by Burr (US\_4,282,745).

Burr discloses an apparatus comprising, a container 15 configured to provide a subject material in a substantially static state and at least one sensor 18 provided at a predefined position relative to the container 15 to monitor the turbidity of the subject material at a desired vertical position of the container 15, a source 17 configured to emit electromagnetic energy towards the container 15 and a receiver 18 configured to receive at least some of the electromagnetic energy, wherein the at least one sensor 18 monitors the turbidity of the subject material in the substantially static state (see abstract, Figure 1) and generating a signal indicative of the turbidity of the subject material after the monitoring (see col.5, line 12), and further comprising rotating the subject material during the monitoring (see col.5, line 66-68).

***Claim Rejections - 35 USC § 103***

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 20, 50 and 60 are rejected under 35 U.S.C. 103(a) as being unpatentable over Burr (US\_4,282,745) in view of Boyer et al (US\_5,446,531).

8. Claim 20 is rejected because:

Art Unit: 2877

- A. Burr teaches all claim limitations except that the sensor comprises a plurality of sensors provided at different predefined positions relative to the container to monitor the turbidity of the subject material at a plurality of desired vertical positions of the container in an apparatus for measuring turbidity of the subject material under test.
  - B. Boyer teaches a sensor comprising a plurality of sensors 36, 40 (see col.8, lines 2-34 and Figure 3) provided at different predefined positions relative to the container to monitor the turbidity of the subject material in an apparatus for measuring turbidity of the subject material under test.
  - C. In view of Boyer's teaching, it would have been obvious to one of ordinary skills in the art at the time the invention was made to incorporate a plurality of sensors/detectors to monitor the subject material from different angles in order to improve the accuracy in the measurement of turbidity of a subject material.
9. Claim 50 is rejected for the same reasons of rejection of claim 20 above and additionally the examiner takes official notice that it would have been obvious to one of ordinary skills in the art at the time the invention was made to monitor the turbidity of the subject material at any predefined vertical position within the container due to the fact that turbidity is different at different height levels and to determine the turbidity at different levels, the sensors/detectors have to be moved to the desired vertical level.
10. Claim 60 is rejected for the same reasons of rejection of claim 20 above and additionally because in view of Burr's and Boyer's teachings, it would have been obvious to one of ordinary skills in the art at the time the invention was made to monitor the turbidity of the subject material in

Art Unit: 2877

a variety of different applications including the processing of a semiconductor workpiece using the subject material.

***Allowable Subject Matter***

11. Claim 64 would be allowable because none of the prior art references disclose a sensor comprising a housing that is configured to attach to a supply connection containing a subject material and detach from the supply connection without disruption of the flow of subject material within the supply connection.

***Conclusion***

12. The prior art cited in the accompanying PTO-892 is made of record and not relied upon, **is considered pertinent** to applicant's disclosure.

13. Several facts have been relied upon from the personal knowledge of the examiner about which the examiner took Official Notice in this office action. Applicant must seasonably challenge well known statements and statements based on personal knowledge when they are made. In re Selmi, 156 F.2d 96, 70 USPQ 197 (CCPA 1946); In re Fischer, 125 F.2d 725, 52 USPQ 473 (CCPA 1942). See also In re Boon, 439 F.2d 724, 169 USPQ 231 (CCPA 1971) (a challenge to the taking of judicial notice must contain adequate information or argument to create on its face a reasonable doubt regarding the circumstances justifying the judicial notice). If applicant does not seasonably traverse the well-known statement during examination, then the object of the well known statement is taken to be admitted prior art. In re Chevenard, 139 F.2d 71, 60 USPQ 239 (CCPA 1943). A seasonable challenge constitutes a demand for evidence made as soon as practicable during prosecution. Thus, applicant is charged with rebutting the well-

Art Unit: 2877

known statement in the **next reply** after the Office action in which the well known statement was made.

14. Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Roy M. Punnoose** whose telephone number is **571-272-2427**.

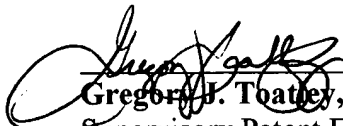
The examiner can normally be reached on 9:00 AM - 5:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, **Gregory J. Toatley, Jr.** can be reached on **571-272-2059**. The fax phone number for the organization where this application or proceeding is assigned is **703-872-9306**.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

**Roy M. Punnoose**  
Patent Examiner  
Art Unit 2877  
April 14, 2005



  
**Gregory J. Toatley, Jr.**  
Supervisory Patent Examiner  
17 Apr 05